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With regard to page 2, paragraph no. 1, the Examiner objected to the amendment filed on September 30, 2001 under 35 USC § 132 because it allegedly introduces new matter in the specification. Applicant respectfully traverses such objection as Applicant did not file an amendment on such date. Accordingly, Applicant respectfully requests the objection be withdrawn.

With regard to page 2, paragraph nos. 2-6, the Examiner also rejected claims 6-13 under 35 USC § 112, first paragraph. Contrary to the Examiner's allegations, Applicant responded in the December 22, 2000 amendment on page 4, lines 12-19. Reconsideration and withdrawal of this rejection is respectfully requested.

In particular, the Examiner alleges that there does not appear to be support in the specification for the claimed element that the motor be “adapted to drive the shaft more than 360 degrees in a single direction” in lines 3-4 of claim 6. Accordingly, the Examiner asserts that adding this recitation is new matter and Applicant needs “to point out where in the specification support for this exact recitation can be found.”

Under the MPEP, the standard for determining compliance with the written description requirement is “does the description clearly allow persons of ordinary skill in the art to recognize that he or she invented what is claimed.” MPEP § 2163.01 (*quoting In re Gosteli*, 872 F.2d 1008, 1012 (Fed. Cir. 1989)). Contrary to the Examiner’s allegations, the “subject matter of the claim need not be described literally (i.e., using the same terms or *in haec verba*) in order for the disclosure to satisfy the description requirement.” MPEP § 2163.01.

For the sake of convenience, Applicant refers the Examiner to U.S. Patent No. 5,754,582 to Dong (hereinafter “the ‘582 Patent”; attached hereto), which has the same specification as the present application except for the claims. All cites below refer to the ‘582 Patent. Applicant also refers to the declaration of Mr. Jerry Teng (hereinafter “Teng Declaration”; attached hereto), a

1 person with about seven years of experience in the laser level field, who is a person of ordinary
2 skill in the art.

3
4 As shown in Figure 8, the '582 Patent discloses a DC motor 14 having a shaft 100 with a small
5 pulley 20 fitted thereon. The '582 Patent, col. 6, lines 51-52 and Teng Declaration, paragraph 6.
6 The main pulley 24 is coupled to a small pulley 24 by means of a pulley belt 22. The '582
7 Patent, col. 6, lines 46-47 and Teng Declaration, paragraph 6. The main pulley 24 in turn has a
8 set of upper magnets 25 secured thereto. The '582 Patent, col. 6, line 43, and Teng Declaration,
9 paragraph 6. The upper magnets 25 magnetically couple to the lower magnets 26, which are
10 disposed on a free wheel 32. The '582 Patent, col. 7, lines 1-13 and Teng Declaration,
11 paragraph 6. The free wheel 32 is rigidly attached to a main shaft 37. The '582 Patent, col. 6,
12 lines 58-59 and Teng Declaration, paragraph 6. The main shaft 37 is part of the module housing
13 36 containing laser diode modules 38, 39. The '582 Patent, col. 6, lines 27-31 and Teng
14 Declaration, paragraph 6.

15 With such arrangement, as DC motor 14 rotates, the small pulley 20 rotates the pulley belt 22,
16 which drives the main pulley 24. The rotation of the main pulley 24 and the attractive force
17 between the upper magnets 25 and lower magnets 26 will cause the free wheel 32 to rotate,
18 which causes the main shaft 37, the module housing 36 and the laser diode modules 38, 39 to
19 rotate until power to motor 14 is interrupted. The '582 Patent, col. 7, lines 8-13, and Teng
20 Declaration, paragraph 7. Until such power is interrupted, motor 14 will continue to rotate the
21 small pulley 20 and ultimately the main shaft 37 and the module housing 36 well past 360
22 degrees to generate a level plane of reference light. The '582 Patent, col. 9, lines 23-26 and
23 Teng Declaration, paragraph 8. When in plane mode, the laser level accordingly provides "a
24 level 360 degree reference plane." The '582 Patent Abstract, lines 12-13 and Teng Declaration,
25 paragraph 8.

26 In other words, the specification provides support for the claimed element that the motor is
27 "adapted to drive the shaft more than 360 degrees in a single direction." Mr. Teng, a person of
28 ordinary skill in the art, confirms such reading. Accordingly, the written description requirement
29 has been met as to claim 6 and its dependent claims.

30 Referring to pages 2-3 of the Office action, the Examiner also rejected claim 11 under 35 USC §
112, first paragraph. In particular, the Examiner wrote "[i]n order for the laser diode to be rotated

1 in a single movement about a line perpendicular with the shaft until the reference plane is
2 perpendicular with the rotating plane implies that the motor coupled to the rotate the shaft and
3 thereby the laser diode in the housing extending from the shaft would have to drive the shaft
4 more than 360 degrees in a single direction." The Examiner accordingly considers the claimed
5 recitation that the "laser diode is rotated in a single movement about a line perpendicular with
6 the shaft until the reference plane is perpendicular with the rotating plane" constitutes new
7 matter and has requested Applicant point out support in the specification.

8 In response, Applicant notes that claim 11 does not require that the motor drive the shaft more
9 than 360 degrees. Instead, the objected recitation relates to a method of alignment in which the
10 laser diode is rotated until the reference plane is perpendicular to the shaft. See, for example,
11 Figures 4-7 and the accompanying specification (e.g., col. 4, line 65 through col. 6, line 10),
12 which support this limitation. Accordingly, the written description requirement has been met as
13 to claim 11 and its dependent claim.

14 Similarly, on page 3 of the Office action, the Examiner rejected claim 13 under 35 USC § 112,
15 first paragraph. In particular, the Examiner objected to the claimed recitation "the shaft being
16 rotated so that the first and second laser diodes produce the level 360 degree reference plane"
17 as containing new subject matter.

18
19 As discussed above, as DC motor 14 rotates, the small pulley 20 rotates the pulley belt 22,
20 which drives the main pulley 24. The rotation of the main pulley 24 and the attractive force
21 between the upper magnets 25 and the lower magnets 26 will cause the free wheel 32 to rotate,
22 which causes the main shaft 37, the module housing 36 and laser diode modules 38, 39 to
23 rotate until power to motor 14 is interrupted. The '582 Patent, col. 7, lines 8-13, and Teng
24 Declaration, paragraph 11. Accordingly, the laser level will generate a level plane of reference
25 light. The '582 Patent, col. 9, lines 23-26 and Teng Declaration, paragraph 11. When in plane
26 mode, the laser level accordingly provides "a level 360 degree reference plane." The '582
27 Patent Abstract, lines 12-13 and Teng Declaration, paragraph 11. Because support for the
28 claimed recitation is found in the specification, as confirmed by Mr. Teng, no new matter exists
29 in claim 13. Accordingly, the written description requirement has been met as to claim 13.
30

1 Also on page 3, the Examiner also rejected claims 6-13 under 35 USC § 112, second
2 paragraph, as indefinite. Reconsideration and withdrawal of this rejection is respectfully
3 requested.

4
5 In particular, the Examiner notes that inserting "level" in the preamble renders claim 6-13
6 "indefinite and incomplete" "since no connective relationships have been recited in claim 6
7 between a laser level and the system components." In response, Applicant notes that no
8 connective relationships need to be established between a claim preamble and the body of a
9 claim. Connective relationships need to be established only between elements within the body
10 of the claim. Accordingly, no amendment is necessary.

11
12 On page 3 of the Office action, the Examiner also objected to the phrase "a motor ... adapted to
13 drive the shaft more than 360 degrees in a single direction" in claim 6. Applicant notes that the
14 primary purpose of the definiteness requirement is to ensure that the scope of the claims is
15 clear so the public is informed of the boundaries of what constitutes infringement of the patent.
16 MPEP§ 2173. Indeed, if the claim apprises one of ordinary skill in the art of its scope, the
17 definiteness requirement is met. *Solomon v. Kimberly Clark Corp.*, 216 F.3d 1372, 1379 (Fed.
18 Cir. 2000) (*cited by* MPEP § 2173.02). In the present application, the objected phrase meets
19 that requirement, in that it clearly tells the public that claim 6 is not infringed if the motor does
20 not drive the shaft more than 360 degrees. Therefore, no indefiniteness exists.

21
22 Similarly, on page 4 of the Office action, the Examiner objected to the phrase "the upper case
23 rotatably supporting the rotating shaft" in claims 6 and 11. In the present case, the objected
24 phrase meets the definiteness requirement, in that it clearly tells the public that claims 6 and 11
25 are not infringed if the case does not rotatably support the rotating shaft. Therefore, no
26 indefiniteness exists.

27
28 Further, the Examiner objected to the phrase "a motor ... adapted to rotatably drive the shaft...
29 so that the first and second laser diodes produce the level 360 degree reference plane" in claim
30 13. Since this phrase is contained in two different parts of the claim, Applicant will address each
part individually. In the present case, the objected phrase meets the definiteness requirement, in

1 that it clearly tells the public that claim 13 is not infringed if (a) the motor does not rotatably drive
2 the shaft and (b) the shaft is not rotated so that the first and second laser diodes produce the
3 level 360 degree reference plane. Therefore, no indefiniteness exists.

4
5 Applicant nevertheless reminds that "Examiners are encouraged to suggest claim language to
6 applicants to improve the clarity or precision of the language used" under MPEP § 2173.02.
7 Accordingly, Applicant invites the Examiner to provide any suggestions for improving the clarity
8 or precision of the language used.

9
10 On pages 4-5, the Examiner rejected claim 6 under 35 USC § 102(b) and/or § 103(a) obvious
11 over U.S. Patent No. 5,144,120 to Krichever et al. (Krichever '120) or U.S. Patent No. 5,401,948
12 to Krichever et al. (Krichever '948)(collectively, Krichever '120 and '948). The Examiner asserts
13 Figure 1A, 5 and 7 of Krichever '120 and '948 disclose the center ray of the beam is
14 perpendicular to the shaft, and that although Krichever '120 and '948 do not describe the shaft
15 being rotated more than 360 degrees in a single direction, they could since it is known shafts
16 can be rotated more than 360 degrees.

17 A claim is anticipated only if each and every element set forth in the claim is found, either
18 expressly or inherently, in a single prior art reference. *Verdegaal Bros. v. Union Oil Co. of*
19 *California*, 2 USPQ 2d 1051, 1053 (Fed. Cir. 1987). Krichever '120 and '948 both fail to disclose
20 all of the elements of claim 6. For example, Krichever '120 and '948 state that the output shaft
21 22 is repetitively driven in arc lengths of less than 360 degrees in each direction (Krichever '120
22 col. 5, lines 22-25 and Krichever '948 col. 4, lines 63-66). By contradistinction, claim 6 requires
23 "a motor coupled to the shaft adapted to drive the shaft more than 360 degrees in a single
24 direction." Such arrangement permits the laser level of claim 6 to delineate a reference plane.
25 Because each of Krichever '120 and '948 do not provide for such arrangement, they cannot
26 anticipate claim 6. Therefore, there cannot be anticipation of claim 6 and it is respectfully
27 submitted that the rejection of claim 6 under 35 USC 102(b) is defective and should be
28 withdrawn.

28 In addition, the Examiner has improperly modified Krichever '120 and '948 because he has not
29 produced a *prima facie* case of obviousness for several reasons. See MPEP § 2142, at 2100-
30 108 ("If the examiner does not produce a *prima facie* case, the applicant is under no obligation
to submit evidence of nonobviousness.").

1 A *prima facie* case of obviousness is established when the Examiner shows: (1) some
2 suggestion or motivation to combine the reference teachings; and (2) that the prior art must
3 teach or suggest all the claim limitations. *Id.* In the present case, neither requirement has been
4 met.

5 At this time, no suggestion or motivation to modify Krichever '120 and '948 as suggested exists
6 since any such modification made to obtain the claimed invention would render Krichever '120
7 and '948 unsatisfactory for their intended purpose. MPEP § 2143.01, at 2100-110 ("If a
8 proposed modification renders the prior art invention being modified unsatisfactory for its
9 intended purpose, then there is no suggestion or motivation to make the proposed
10 modification.") (Citing *In re Gordon*, 733 F.2d 900 (Fed. Cir. 1984)).

11 In the present case, Krichever '120 and '948 provide a hand-held scanner with an oscillating
12 shaft for scanning a bar code without projecting a beam that reaches the operator or a
13 customer. If the scanner is modified as suggested by the Examiner, the projected beam would
14 reach the operator or a customer. In other words, the suggested modification would render the
15 prior art device unsatisfactory for its intended purpose. Therefore, no suggestion or motivation
16 to modify Krichever '120 and '948 exists. Accordingly, the Examiner has failed to establish a
17 *prima facie* case of obviousness, and should thus withdraw the rejection.

18 Furthermore, Krichever '120 and '948 fail to teach all the claimed limitations. In the present
19 case, the claim calls for a laser level system. As discussed above, Krichever '120 and '948
20 disclose a hand-held bar code scanner, ~~not a laser level system~~. Similarly, Krichever '120 and
21 '948 fail to disclose a center ray perpendicular to the rotating shaft. Even if the Figure 1A center
22 ray appears to the Examiner as perpendicular to the shaft, there is no apparent disclosure in
23 Krichever '120 and '948 on how to actually achieve perpendicularity as recited in claim 6. And
24 Krichever '120 and '948 present no motivation to achieve this perpendicularity because they
25 deal with hand held bar code scanning. Such perpendicularity is not required, because the bar
26 code is held close to the hand held scanner and the bar code itself is large such that the center
27 ray need not be perpendicular with the shaft. This contrasts with a laser level system, which
28 must maintain the center ray perpendicular to the shaft to project a useable line on a surface at
29 a distance, for example, for construction work, such as hanging dry wall. There is no motivation
30 to modify the Krichever '120 and '948 laser scanners to work more precisely than necessary for
an added cost. In view of the above, Krichever '120 and '948 do not anticipate nor would they

only
title

1 have rendered claim 6 obvious before or after entry of the 35 USC 112 amendments requested
2 here.

3
4 In view of the foregoing, all the claims are patentable and the application is believed to be in
5 condition for formal allowance. Reconsideration of the application and allowance of claims 6-13 are
6 respectfully requested.

7 Please call if you have a question, comment, or it will expedite progress of the application.
8

9 Respectfully submitted,

10
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